10

15

20

SUMMARY

HETEROGENEOUS CATALYST COMPONENTS FOR OLEFINS

It is shown metallocenes with functionalized bridge of formula

$$\left[\begin{array}{c} Y_{j} - (E) - Z \\ \end{array} \right]_{k}^{L} MY_{(m-2)}$$

$$(I)$$

wherein M represents a transition metal of groups 3, 4, 5 or 6, L represents cyclopentadienyl-type ligands, Y represents a halogen and which can own one or various bridges between unities L. At least one of these bridges is functionalized through a group constituted by the union between a halogen atom and a silicon, germanium or tin atom. It is also shown a method for the synthesis of these metallocene compounds starting from the corresponding metallic halure and a precursor of the ligand which has leaving groups. These metallocene compounds are used as catalyst precursors for the homopolymerization and copolymerization of olefins. It is also shown methods for supporting these metallocenes on inorganic solids in order to obtain solid catalyst systems for olefins polymerization processes in a heterogeneous phase.